WHAT IS CLAIMED IS:

1.   An apparatus to be connected to a serial bus of IEEE-1394 standard, said apparatus comprising:

a 1394 signal input/output port section having two or more input/output ports to be connected to another apparatuses functioning as parent and child nodes;

a non-node configuration control section which controls the configuration in such a manner that said apparatus is not recognized as a node;

a normal configuration control section which controls the configuration in such a manner that said apparatus is recognized as a node;

a mode switching section which enables input/output of said non-node configuration control section or said normal configuration control section with respect to said 1394 signal input/output port section;

mode switching unit which controls switching of said mode switching section; and

a PHY configuration packet output section which generates a PHY configuration packet for resetting an apparatus of another node as a route node so as to output the PHY configuration packet to said normal configuration control section.

2.   The apparatus according to claim 1, wherein when one

18

of the two input/output ports of said 1394 signal input/output port section is connected to an another apparatus functioning as the parent node and the other port is connected to an another apparatus functioning as the child

5　node and said apparatus does not become a route node in a tree identification phase, said non-node configuration control section neither obtains a self phisical_ID nor transmits a self_ID packet in a self-identification phase but transmits an ident_done signal received from the child

10　node directly to the parent node.

3.　The apparatus according to claim 1, wherein when one of the two input/output ports of said 1394 signal input/output port section is connected to an another

15　apparatus functioning as the parent node and the other port is connected to an another apparatus functioning as the child node and said apparatus becomes a route node in the tree identification phase, said non-node configuration control section passes the process of the self-identification phase

20　to said normal configuration control section.

4.　The apparatus according to claim 3, wherein when said normal configuration control section takes over the process of the self-identification phase from said non-node

25　configuration control section, said normal configuration

19

control section obtains a self phisical_ID and transmits a self_ID packet and permits said PHY configuration packet output section to output the PHY configuration packet.

5   5.   The apparatus according to claim 1, being a bus analyzer for analyzing operations on the serial bus of the IEEE-1394 standard.

       6.   A configuration method comprising the steps of:
10   specifying a non-node mode for controlling configuration so that an apparatus is not recognized as a node or a normal mode for controlling configuration so that the apparatus is recognized as a node;
             initializing a serial bus of an IEEE-1394 standard and
15   recognizing a tree;
             when the non-node mode is specified at the mode specifying step, checking whether the apparatus becomes a route node or not; and
             when a judgment is made that the apparatus does not
20   become a route node, neither obtaining a self phisical_ID nor transmitting a self_ID packet but transmitting an ident_done signal received from a child node directly to a parent node.

25   7.   The configuration method according to claim 6, wherein

when a judgment is made that the apparatus becomes a route node, the configuration method further comprising the steps of:

obtaining a self phisical_ID and transmitting a
5   self_ID packet; and

generating a PHY configuration packet for resetting an apparatus of another node as a route node so as to output the PHY configuration packet after the self-identification.

10   8.   The configuration method according to claim 6, wherein when a normal mode is specified, the configuration method further comprising the steps of:

initializing the serial bus of the IEEE-1394 standard; and

15   obtaining a self phisical_ID and transmitting a self_ID packet after the tree identification are carried out.